

OCT 12 2006

Docket No.: 21581-00256-US1

Application No. 10/669,503
Amendment dated
Reply to Office Action of July 12, 2006

REMARKS

Claims 1-14, 16-18 and 33-37 are now pending in the present application. Claims 12-14 and 16-17 are drawn to the elected invention. Claims 1-11, 18 and 33-37 are directed to non-elected invention and may be canceled by the examiner upon the allowance of the claims directed to the elected invention. As a preliminary matter, please correct the US Patent No for Hummel on the form 1449, as shown by the attached, to read "6,037,158" in place of "637158".

The Request for compliance with the sequence rules, Objections to the claims and rejection of the claims under 35 USC 101 have been overcome by amendments to the claims and to Figure 1 for purposes of clarification by including the recitations preferred by the examiner as expressed in the office action. Figure 1 has been amended to recite "SEQ. ID NO 1". Therefore, Applicants respectfully request that these objections and rejections be withdrawn.

In addition claim 12 has been amended to include recitations from claim 15. Accordingly, Claim 15 has been canceled without prejudice or disclaimer. Applicant has amended claims 16 and 17 to read "isolated from" instead of "derived from". Claims 1, 2, 6-14, 16, 17, 18, and 33-35 have been changed to read "isolated enzyme" instead of just enzyme. All names of microorganisms have italicized as requested by the Examiner.

The Examiner stated that the specification is missing a Brief Description of the Drawings, however, a Brief Description of the Drawings is recited on lines 25-30 on page 28 of the English translation of the specification. Applicants respectfully requests withdrawal of this objection.

The rejection of Claims 12, 13, 15-17 under 35 USC 112, second paragraph has been overcome by amendments to claim 12. In particular, Claim 12 has been amended to recite the phrase "to give" to include the condition of the enzyme of the present invention having "reducing ability" and to recite "not more than 10%" in place of "very low".

The rejection of Claim 14 under 35 USC 112, second paragraph has been overcome by the amendments to Claim 14 as preferred by the examiner as stated in the office action.

Claims 12-17 were rejected under 35 USC 112, first paragraph. The Examiner stated that the specification only teaches one species, the reductase comprising the amino acid sequence of SEQ ID NO:1 and having the recited properties, and that determination of variants, mutants and recombinants of SEQ ID NO:1 or a reductase isolated from any source having the desired

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biological characteristics recited in the claim is unpredictable and the experimentation left to those skilled in the art is extensive and undue. This rejection is not deemed tenable. In particular, claims 12 and 13 have been amended to recite the origin of the enzyme as being the genus *Candida*. Persons skilled in the art, once aware of the present disclosure, could obtain the enzyme of amended claims 12 and 13 without undue experimentation.

Concerning claim 14, applicant has amended the scope of deletion, substitution and/or addition of the amino acid sequence of SEQ ID NO: 1 to "one amino acid". Accordingly, persons skilled in the art, once aware of the present disclosure, could obtain the enzyme of amended claim 14 without undue experimentation.

Claim 17 was rejected under 35 USC 112, first paragraph. It seems that this rejection is based upon the view that *Candida maris* IFO 10003 in claim 17 is a novel microorganism. However, the public knew of and could obtain this strain on the date of invention of the present application because this strain had been deposited in INSTITUTE FOR FERMENTATION, OSAKA (IFO). A copy of the catalog of "List of Cultures" is enclosed herewith. Moreover, attached is a statement clarifying that the strain will be irrevocably and without restriction or condition released to the public upon the issuance of the patent. Accordingly, withdrawal of this rejection is respectfully requested.

Claims 12-17 were rejected under 35 USC 102(e) as being anticipated by US Patent 6,037,158 to Hummel et al. (hereinafter also referred to as "Hummel"). Hummel fails to anticipate claims 12-14 and 16-17. This rejection seems to be based on the interpretation of the claims as not including any limitation on the structure of the claimed polypeptides. As discussed above, claim 12 has been amended to include the origin of the enzyme as being the genus *Candida*. On the contrary, the enzyme of Hummel et al. is obtained from *Lactobacillus brevis*.

Furthermore, Applicant has amended claim 14 item (b) to change the scope of alteration of amino acid sequence of SEQ ID NO: 1 to "one amino acid", so that the amino acid sequence of the enzyme of amended claim 14 is quite different from that of Hummel et al. Additionally, Hummel does not disclose that a polypeptide reduces stereoselectively 5-acetylfuro [2,3-c]pyridine to 5-(1-(R)-hydroxyethyl) furo [2,3-c]pyridine. Support for the conclusion in the office action or the reasoning behind it that a polypeptide of Hummel et al., reduces stereoselectively 5-acetylfuro[2,3-c]pyridine to 5-(1-(R)-hydroxyethyl) furo [2,3-c]pyridine is

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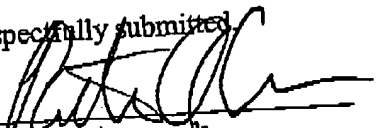
not apparent or evident. Thus the enzyme of the present invention differs significantly from that of Hummel et al. Therefore, amended claims 12, 14 and claims dependent thereon are novel.

In view of the above amendment, applicant believes the pending application is in condition for allowance.

Applicant believes no fee is due with this response. However, if a fee is due, please charge our Deposit Account No. 22-0185, under Order No. 21581-00256-US1 from which the undersigned is authorized to draw.

Dated: 10-12-06

Respectfully submitted,

By 
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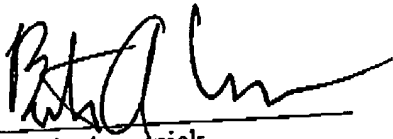
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I hereby declare that all statements made herein of my own knowledge are true and that all statements made on information and belief are believed to be true; and further that these statements were made with the knowledge that willful false statements and the like so made are punishable by fine or imprisonment, or both, under Section 1001 of Title 18 of the United States Code and that such willful false statements may jeopardize the validity of the application or any patent issued thereon.

Dated: October 12, 2006

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